| Index o | of Claims |
|---------|-----------|
|         |           |

| Appl | ication | /Cont | rol No. |
|------|---------|-------|---------|

10/751,482 Examiner

Date

Applicant(s)/Patent under Reexamination

CHANG, KI-SOO

Art Unit

Awudzi Z. Agbottah

2632

| <b>√</b> | Rejected |
|----------|----------|
| 11       | Allowed  |

| - | (Through numeral)<br>Cancelled |
|---|--------------------------------|
|   | Restricted                     |

Claim

| N | Non-Elected  |
|---|--------------|
| _ | Interference |

| A | Appeal   |
|---|----------|
| 0 | Objected |

|              |                      |  |              |  |                           |  | 3            |              | _  |                 |  |
|--------------|----------------------|--|--------------|--|---------------------------|--|--------------|--------------|--|-----------------|--|
| Cla          | aim                  |  | Date         |  |                           |  |              |              |  |                 |  |
| Final        | Original             | 7/27/06  |              |  |                           |  |              |              |  |                 |  |
|              | 1                    | 1  |              | <del>                                     </del> | $\vdash$                  |  | 1            | $\vdash$     |  |                 |  |
|              | 2                    | V  | Г            |  |                           |  | $\vdash$     |              |  | П               |  |
|              | 2                    | 1  |              |  |                           |  |              |              |  |                 |  |
|              | 4                    | 1  |              |  |                           |  |              |              |  |                 |  |
|              | 5                    |  |              |  |                           |  |              |              |  |                 |  |
|              | 6                    | 1  |              | _  |                           |  |              |              |  |                 |  |
|              | 7                    | 1  |              |  |                           | L  |              |              | <u> </u>                                     |                 |  |
|              | 8                    | V  |              |  |                           | _  | <u> </u>     | <u> </u>     | <u> </u>                                     | Щ               |  |
| <u> </u>     | 9                    | 1  | _            | _  | <u> </u>                  | _  | _            | _            | <u>                                     </u> |                 |  |
| <u> </u>     | 10                   | V  | <u> </u>     | <u> </u>   | <u> </u>                  | <u> </u>   | ⊢            | <u> </u>     | <b> </b> -                                   | Н               |  |
| ļ            | 11                   | 1  | $\vdash$     | ⊢  | ⊢                         | -  | -            |              | ⊢  | $\vdash \vdash$ |  |
| <u> </u>     | 12                   | 1  | -            | <u> </u>   | $\vdash$                  | -  | -            | -            | ⊢  | $\vdash$        |  |
| $\vdash$     | 14                   |  | <del> </del> | ⊢  | ┝                         | ├-   | <del> </del> | $\vdash$     | $\vdash$                                     | Н               |  |
| <u> </u>     | 12<br>13<br>14<br>15 | 1  | $\vdash$     | $\vdash$   | $\vdash$                  | ⊢  | -            | $\vdash$     | $\vdash$                                     | Н               |  |
| $\vdash$     | 16                   | -  | $\vdash$     | $\vdash$   | ┝                         | ├  | -            | -            | $\vdash$                                     | Н               |  |
| $\vdash$     | 17                   | -  | ┝            | H  |                           |  | $\vdash$     | -            | -  | Н               |  |
| <u> </u>     | 18                   | _  | -            | ┢╾   | $\vdash$                  | $\vdash$   | $\vdash$     | $\vdash$     | ┝  |                 |  |
|              | 19                   | H  | ┢            | H  | $\vdash$                  | ┢  | $\vdash$     | H            | $\vdash$                                     | Н               |  |
|              | 20                   | $\vdash$   | $\vdash$     | $\vdash$   | -                         | <del>                                     </del> | $\vdash$     | $\vdash$     | $\vdash$                                     |                 |  |
|              | 21                   | ┢  | ┢            | ┢  | _                         | $\vdash$   |              | _            | ┢  | -               |  |
|              | 22                   | $\vdash$   | $\vdash$     |  |                           |  |              |              | Г  | П               |  |
|              | 23                   |  |              |  |                           |  |              |              |  | П               |  |
|              | 23<br>24             |  |              |  |                           |  |              |              |  |                 |  |
|              | 25                   |  |              |  |                           |  |              |              |  |                 |  |
|              | 26                   |  |              |  |                           |  | L            |              |  |                 |  |
|              | 27                   |  |              |  |                           |  |              | L            |  | Ц               |  |
|              | 28                   |  | _            | L  | ·_                        | L  | _            | <u> </u>     | <u> </u>                                     | Ш               |  |
| igsquare     | 29                   | <u></u>  | L_           |  | _                         | L  | L            | <u> </u>     | L_   | Ш               |  |
|              | 30                   | _  | _            | _  | $ldsymbol{ldsymbol{eta}}$ | <u> </u>   | <u> </u>     | _            | _  | Ш               |  |
| $\vdash$     | 31                   | ┡  | <u> </u>     | _  | _                         | <u> </u>   |              | _            | _  | Н               |  |
|              | 32                   | <u> </u>   | $\vdash$     | <u> </u>   |                           | <u> </u>   | $\vdash$     | _            | $\vdash$                                     | $\vdash$        |  |
| $\vdash$     | 33                   | $\vdash$   | $\vdash$     | $\vdash$   | -                         | $\vdash$   | <u> </u>     | _            | -  | $\vdash\vdash$  |  |
|              | 34<br>35             | $\vdash$   | $\vdash$     | $\vdash$   | _                         | $\vdash$   | <u> </u>     |              | -  | $\vdash \vdash$ |  |
|              | 36                   | ⊢  | <del> </del> | $\vdash$   | <u> </u>                  | -  | ├            | <u> </u>     |  |                 |  |
|              | 37                   | $\vdash$   | Η-           | H  | $\vdash$                  |  | ├            | <u> </u>     | -  | $\vdash \vdash$ |  |
| H            | 38                   | <del>-</del>   | -            | $\vdash$   | _                         | $\vdash$   | $\vdash$     | <del> </del> | $\vdash$                                     | Н               |  |
| Н            | 39                   | -  |              |  | Т                         | Н  | H            | -            | $\vdash$                                     | H               |  |
|              | 40                   |  | $\vdash$     | _  |                           | Н  | ┢            | _            | $\vdash$                                     | H               |  |
|              | 41                   | П  | П            | Ŧ  | $\vdash$                  |  | $\vdash$     | $\vdash$     | Г  | Н               |  |
|              | 42                   | Г  | Г            |  |                           | П  | $\vdash$     |              | $\vdash$                                     | Н               |  |
|              | 43                   |  | П            |  |                           |  |              |              |  | П               |  |
|              | 44                   | П  |              |  |                           |  |              |              |  | П               |  |
|              | 45                   |  |              |  |                           |  |              |              |  |                 |  |
|              | 46                   |  |              |  |                           |  |              |              |  |                 |  |
|              | 47                   |  |              |  |                           |  |              |              |  |                 |  |
|              | 48                   |  |              |  |                           |  |              |              |  |                 |  |
| $oxed{oxed}$ | 49                   | $ldsymbol{ld}}}}}}$ |              |  |                           |  | L_           | L_           | <u> </u>                                     | Ш               |  |
|              | 50                   |  |              |  |                           |  |              |              |  |                 |  |

|   | Cla   | 11171    | Date     |              |  |  |              |          |  |              |               |
|---|-------|----------|----------|--------------|--|--|--------------|----------|--|--------------|---------------|
|   | Final | Original |          |              |  |  |              |          |  |              |               |
|   |       | 51<br>52 | $\vdash$ | F            |  |  | Т            | -        |  | $\vdash$     |               |
|   |       | 52       |          |              |  |  |              |          |  |              | $\overline{}$ |
|   |       | 53       |          |              |  |  |              |          | Г  | ┢            | $\vdash$      |
|   |       | 54       | _        | -            | -  |  |              | -        | Н  | -            | -             |
|   | -     | 55       | _        | $\vdash$     | -  | -  | <del>-</del> | <u> </u> | -  | ⊢            | -             |
|   |       | 55       | _        | -            | _  |  | _            | _        | <u> </u>   | -            | ├             |
|   |       | 56       |          | <u> </u>     | <u> </u>   |  |              |          | _  | <u> </u>     | <u> </u>      |
| 1 |       | 57       |          | ļ            | _  |  |              |          | _  | $oxed{oxed}$ |               |
|   |       | 58       | _        | <u></u>      | <u> </u>   | <u></u>  |              |          |  |              |               |
| - |       | 59       |          |              |  |  |              |          |  |              |               |
| 1 |       | 60       |          |              |  |  |              |          |  |              |               |
| i |       | 61       |          |              |  |  |              |          |  | Г            |               |
|   |       | 62       |          | Г            |  |  | П            |          |  | Г            | П             |
| } |       | 63       |          |              | $\vdash$   | $\vdash$   |              | _        | ┢  | $\vdash$     | $\vdash$      |
|   |       | 64       |          | $\vdash$     | $\vdash$   |  | $\vdash$     | -        | <del>                                     </del> | -            | $\vdash$      |
|   |       | 65       | $\vdash$ | -            | $\vdash$   | H  | $\vdash$     | ⊢        | <del> </del>                                     | -            | $\vdash$      |
|   | -     | 65<br>66 | <u> </u> | <del>ا</del> | -  | <del>                                     </del> | $\vdash$     |          | <del> </del>                                     |              | $\vdash$      |
| - |       | ьь       | <u> </u> | <u> </u>     |  | _  |              | _        | <u> </u>   | ┞            | <u> </u>      |
| ļ |       | 67       |          | <u> </u>     | <u> </u>   | _  | _            |          | <u> </u>   | L            | _             |
| ļ |       | 68<br>69 |          |              |  | L  |              | _        | L_   | L            | $oxed{oxed}$  |
|   |       | 69       |          |              |  |  |              |          |  |              |               |
|   |       | 70       |          |              |  |  |              |          |  |              |               |
|   |       | 71       |          |              |  |  |              |          |  |              |               |
|   |       | 72       | ,        |              |  |  |              |          |  |              |               |
|   |       | 73       |          | Г            |  |  |              |          |  |              |               |
|   |       | 73<br>74 | H        | ┢            | $\vdash$   |  |              | _        |  |              |               |
|   |       | 75       | _        | $\vdash$     | $\vdash$   | H  | -            | $\vdash$ | -  | _            |               |
|   |       | 76       | _        | $\vdash$     | ┢  |  |              | $\vdash$ |  |              | $\vdash$      |
|   |       | 76<br>77 | _        |              | _  | -  | $\vdash$     | _        | $\vdash$   | -            | -             |
|   |       | 78       | $\vdash$ | $\vdash$     | $\vdash$   | $\vdash$   | _            | -        | $\vdash$   | $\vdash$     | Н             |
|   |       | 79       |          | -            | ┝  | H  | _            | <u> </u> | -  |              | Н             |
|   |       | 79       | _        | -            | ├—   | ├  | H            | _        | -  | -            | Н             |
|   |       | 80       | _        | $\vdash$     | _  | <b>—</b>   |              |          | _  | _            | _             |
|   |       | 81       | _        | L            | <u> </u>   | <u> </u>   | $\vdash$     | _        |  |              | L.            |
| ļ |       | 82       | L        | ļ            | <u> </u>   | igspace  | Ш            |          | <u> </u>   | oxdot        | Щ             |
| ļ |       | 83       |          | lacksquare   | <u> </u>   | <u> </u>   | Ш            |          | L  |              | Ш             |
| . |       | 84       |          | <u> </u>     | <u> </u>   | <u> </u>   |              | Ш        |  |              | Ш             |
|   |       | 85       | <u> </u> | oxdot        | _  | _  |              |          |  |              |               |
|   |       | 86       |          |              | L  |  |              |          |  |              |               |
|   |       | 87       |          |              |  |  |              |          |  |              |               |
|   |       | 88       |          |              |  |  |              |          |  |              |               |
|   |       | 89       |          |              |  |  |              |          |  |              | П             |
|   |       | 90       |          |              | Π  |  | $\Box$       |          |  |              | П             |
|   |       | 91       |          |              |  |  |              |          |  |              | П             |
|   |       | 92       |          |              |  |  |              |          |  |              |               |
|   |       | 93       |          |              |  |  |              |          |  |              |               |
|   |       | 94       |          |              |  |  |              |          |  |              | П             |
|   |       | 95       |          | П            |  |  |              |          | П  |              | П             |
| ı |       | 96       |          | $\vdash$     |  | $\vdash$   |              |          | $\vdash$   |              | П             |
|   |       | 97       |          | $\vdash$     |  | $\vdash$   |              |          |  |              | Н             |
|   |       | 98       |          | -            |  |  | -            | -        |  | Н            | $\vdash$      |
|   |       | 99       | _        | -            | -  |  | _            | -        |  | _            | $\vdash$      |
|   |       | 100      | -        | $\vdash$     | <del>                                     </del> | -  | -            | -        | $\vdash$   | -            | $\vdash$      |
|   |       | IVV      |          |              |  |  |              | l        |  | L _          |               |

| Cli      | aim        | Date         |                    |              |          |          |          |              |              | $\neg$          |
|----------|------------|--------------|--------------------|--------------|----------|----------|----------|--------------|--------------|-----------------|
|          |            |              |                    |              | Γ        |          |          |              |              | П               |
| la l     | Original   |              |                    | l            |          | l        |          |              |              |                 |
| Final    | )rig       |              |                    |              |          |          |          |              |              |                 |
|          |            |              | [ _                |              |          |          |          |              |              | ŀ               |
|          | 101        |              |                    |              |          |          |          |              |              |                 |
|          | 102        |              |                    |              |          |          |          |              |              |                 |
|          | 103        |              |                    |              |          |          |          |              | ٠            |                 |
|          | 104<br>105 |              | _                  | $oxed{oxed}$ | <u> </u> |          |          | Ш            |              | Ш               |
|          | 105        |              | L                  | L            | <u> </u> | <u></u>  |          | <u> </u>     |              | Щ               |
|          | 106        |              |                    | L            | <u> </u> | _        |          | $oxed{oxed}$ |              | Ш               |
|          | 107        |              | _                  | _            | _        | _        |          | L            | L_           | Ш               |
|          | 108        |              |                    | _            | <u> </u> | <u> </u> |          | <u> </u>     | L,           |                 |
|          | 109<br>110 |              |                    | <u> </u>     | _        | ļ        | _        | $\vdash$     | _            | Щ               |
|          | 110        | _            |                    | -            | -        | _        | <u> </u> | <u> </u>     | -            | $\vdash$        |
|          | 111        |              | _                  | _            | -        | $\vdash$ |          | <u> </u>     | _            | $\vdash$        |
| <u> </u> | 112<br>113 | $\vdash$     | <u> </u>           | -            | <u> </u> | <u> </u> | $\vdash$ | <u> </u>     | ├            | $\vdash \vdash$ |
| <u> </u> | 113        | $\vdash$     |                    | ⊨            | H        | $\vdash$ | i—       | <u> </u>     | ⊢            | ┝╌┤             |
|          | 114<br>115 | H            | ⊨                  | -            | ⊢        | _        | _        | ├-           | -            | ⊢┤              |
|          | 116        | <del> </del> |                    | -            | ├        |          | <u> </u> | <u> </u>     | -            | ⊢⊦              |
|          | 117        | -            | _                  | ⊢            | ⊢        | -        | -        | ├            | -            | Н               |
| _        | 117        |              |                    |              | $\vdash$ | H        |          | <u> </u>     |              | Н               |
|          | 118<br>119 |              | $\vdash$           | -            | ⊢        | ⊢        |          | ⊢            | $\vdash$     | Н               |
|          | 120        |              |                    | <del> </del> | ⊢        | H        | $\vdash$ | $\vdash$     | -            | Н               |
|          | 120<br>121 |              | _                  | -            | _        |          | -        | ┝            | -            | $\vdash\vdash$  |
|          | 122        | _            | _                  | -            | ⊢        | ├        | -        | ┝            | -            | Н               |
|          | 122        |              |                    | -            |          | ├        | $\vdash$ | ┝            | $\vdash$     | ├┤              |
|          | 123<br>124 | -            |                    | H            | ┝        | -        | -        |              | $\vdash$     | Н               |
|          | 125        |              | -                  | -            | -        | _        |          | ┝            | $\vdash$     | Н               |
|          | 126        |              | -                  | $\vdash$     | -        | Н        | _        | $\vdash$     | H            | Н               |
|          | 126<br>127 |              |                    | $\vdash$     | -        |          |          | Г            |              | Н               |
|          | 128        |              |                    | Г            | $\vdash$ |          |          | _            | Г            | Н               |
|          | 128<br>129 |              | Т                  |              |          |          |          |              |              | $\Box$          |
|          | 130        |              |                    |              |          |          |          |              | П            | П               |
|          | 131        |              |                    | $\vdash$     |          |          |          |              |              | П               |
|          | 132        |              |                    |              |          |          |          |              |              | П               |
|          | 133        |              |                    |              |          |          |          |              |              |                 |
|          | 134        |              |                    |              |          |          |          |              |              |                 |
|          | 135        |              |                    |              |          |          |          |              |              |                 |
|          | 136        |              | $oxedsymbol{oxed}$ |              |          |          | Ш        |              |              | Ш               |
|          | 137<br>138 |              | L                  |              | <u> </u> | Ш        | Ш        | Ш            | Ш            | Ш               |
|          | 138        |              | _                  | L            |          |          |          |              | $oxed{oxed}$ | Ш               |
|          | 139        |              |                    | ļ            | _        |          | L        | L.           | L            | Ш               |
|          | 140        | _            | _                  | Щ            | Щ        | Щ        |          | L.,          | <u> </u>     | Щ               |
|          | 141        |              | <u> </u>           | $\vdash$     | L.       |          | Ш        | L            | $\vdash$     | Ш               |
| <u> </u> | 142        |              | <u> </u>           | <u> </u>     | $\vdash$ | $\vdash$ | L_       | <u> </u>     | <u> </u>     | $\vdash \vdash$ |
|          | 143        | _            | <u> </u>           | Щ            | L_       | L.       | _        | <u> </u>     | <u> </u>     | Щ               |
|          | 144        | L.           | _                  | Щ            | <u> </u> | $\vdash$ |          | Ш            | $\vdash$     | Щ               |
| <u> </u> | 145        |              | <u> </u>           | <u> </u>     | <u> </u> |          | _        | _            | <u> </u>     | $\vdash \vdash$ |
|          | 146        |              | _                  | <u> </u>     | <u> </u> |          | -        |              | <u> </u>     | $\sqcup$        |
|          | 147        |              | <u> </u>           | ļ            | L        | <u> </u> | _        |              | L_           | $\sqcup$        |
|          | 148        |              | _                  | <b>-</b>     | <u> </u> | $\vdash$ | <u> </u> | _            | <u> </u>     | $\vdash \vdash$ |
|          | 149        |              | _                  | <u> </u>     | <u> </u> | $\vdash$ | $\vdash$ | L            | <u> </u>     | $\vdash \dashv$ |
| لــــــا | 150        |              |                    |              |          |          |          | Ц.           |              | لــا            |